## WHAT IS CLAIMED IS:

A reagent composition comprising:

A tetrazolium dye;

A phenazine electron transfer agent; and

An effective amount of a Group IIIA compound and/or a flavin stabilizing agent.

The composition according to Claim 1, wherein said flavin stabilizing agent is

FAD.

- 3. The composition according to Claim-1, wherein said Group IIIA stabilizing agent is a borate or boric acid.
- 4. The composition according to Claim 1, wherein said reagent composition comprises an analyte oxidizing signal producing system.
  - 5. The composition according to Claim 4, wherein said analyte oxidizing signal producing system comprises an analyte oxidase.
- 20 6. The composition according to Claim 4, wherein said analyte oxidizing signal producing system comprises an analyte dehydrogenase.
  - 7. The composition according to Claim 4, wherein said phenazine compound is PES.
- 25 8. The composition according to Claim 4, wherein said analyte oxidizing signal producing system further comprises an enzyme cofactor.
  - 9. The composition according to Claim 1, wherein said composition is a fluid composition.

- 10. The composition according to Claim 1, wherein said composition is a dry composition.
- 11. A reagent test strip comprising:

A substrate; and

An analyte oxidizing signal producing system present on said substrate, wherein said analyte oxidizing signal producing system includes: (a) a water soluble tetrazolium salt; (b) a phenazine electron transfer agent; and (c) an effective amount of Group IIIA compound and/or flavin stabilizing agent.

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- 12. The test strip according to Chaim 11, wherein said wherein said flavin stablizing agent is FAD.
- 13. The test strip according to Claim 11, wherein said Group IIIA stabilizing agent is a borate or boric acid.
  - 14. The test strip according to Claim 11, wherein said analyte oxidizing signal producing system comprises an analyte oxidase.
- 20 15. The test strip according to Claim 14 wherein said phenazine is PES.
  - 16. The test strip according to Claim 14, wherein said analyte oxidizing signal-producing system further comprises an enzyme cofactor.
- 25 17. The test strip according to Claim 10, wherein said analyte oxidizing signal producing system is a glucose oxidizing signal producing system.
  - 18. An analyte detection or measurement system comprising:
    - (A) A reagent test strip comprising:
      - (i) A substrate; and

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- (ii) An analyte oxidizing signal producing system present on said substrate, wherein said analyte oxidizing signal producing system includes: (a) a water soluble tetrazolium salt; (b) a phenazine electron transfer agent; and (c) an effective amount of Group IIIA compound and/or flavin stabilizing agent; and
- (B) An automated instrument.
- 19. A method for detecting the presence or determining the concentration of an analyte in a sample, said method comprising:
  - (A) Applying said physiological sample to a reagent test strip comprising:
  - (i) A substrate; and
  - (ii) An analyte oxidizing signal producing system present on said substrate, wherein said analyte oxidizing signal producing system includes: (a) a water soluble tetrazolium salt; (b) a phenazine electron transfer agent; and (c) an effective amount of Group IIIA compound and/or flavin stabilizing agent;
  - (B) Detecting said spot; and
- (C) Relating said detected spot to the presence or concentration of said analyte in said physiological sample.
- 20. The method according to Claim 19, wherein said signal producing system further comprises an analyte oxidase.
  - 21. The method according to Claim 20, wherein said phenazine is PES.
- 22. The method according to Claim 19, wherein said sample is whole blood or a derivative thereof.
  - 23. The method according to Claim 19, wherein said detecting and relating steps are carried out by an automated instrument.
- 30 24. A kit for use in determining the concentration of an analyte in a physiological sample, said kit comprising:

(A) A reagent test strip comprising:

- (i) A substrate; and
- (ii) An analyte oxidizing signal producing system present on said substrate, wherein said analyte oxidizing signal producing system includes: (a) a water soluble tetrazolium salt; (b) a phenazine electron transfer agent; and (c) an effective amount of Group IIIA compound and/or flavin stabilizing agent; and
- (B) At least one of:
  - (i) A means for obtaining said physiological sample and
  - (ii) An analyte standard.

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- 25. The kit according to Claim 24, wherein said means for obtaining said physiological sample is a lance.
- 26. The kit according to Claim 24, wherein said analyte standard comprises a standardized concentration of a known reagent.
  - 27. The kit according to Claim 24, wherein said kit comprises a means for obtaining said physiological sample and an analyte standard.
- 28. A method for stabilizing a tetrazolium dye-phenazine reagent composition, said method comprising:

Including in said reagent composition an effective amount of a Group IIIA compound and/or a flavin stabilizing agent.

- 25 29. The method according to Claim 28, wherein said Group IIIA compound is a borate or boric acid.
  - 30. The method according to Claim 28, wherein said flavin is FAD.
- 30 31. The method according to Claim 28, wherein said reagent composition is a dry composition.



